

Fermi 2004 Initial Licensing Examination Outline Comments and Resolution

Written

RO EXAM

Tier 3 K/A's 2.1.7 and 2.3.4 are not tied to 10 CFR 55.41 which would make them inappropriate for an RO exam unless the licensee has a RO learning objective for those specific topics.

Licensee stated that they have RO learning objectives for these K/As and will submit the learning objectives with the questions when the examination is submitted.

SRO EXAM

ES 401 Section D.1.c states that the "K/A statements that are linked to 55.41 topics but not to 55.43 may also be appropriate for developing SRO-level questions if they evaluate knowledge and abilities at a level that is **unique** to the SRO job position as determined by the licensee's learning objectives." The licensee did not submit site specific SRO-only learning objectives along with the outline for the following K/A's to verify they are acceptable for use on the SRO examination.

295038 High Off-site Release Rate / 9 K2.05 is not tied to 10 CFR 55.43

203000 RHR/LPCI: Injection Mode A2.04 is not tied to 10 CFR 55.43

234000 Fuel Handling Equipment K5.02 is not tied to 10 CFR 55.43

Licensee stated that they have SRO-only learning objectives for these K/As and will submit the learning objectives with the questions when the examination is submitted.

Administrative Topics Outline

RO EXAM

How does "Verification of Offsite Electrical Lineup" fit under Conduct of Operations? In addition, the K/A selected for the conduct of operations JPM does not come from Section 2 of the K/A catalog. ES-301 section D.3.a states that K/A's associated with each administrative topic can be found in Section 2 of the applicable K/A catalog.

Licensee stated that it fits under verification of plant parameters and that the associated K/A should be 2.1.31.

None of the 4 administrative topics list whether they are direct from the bank, new, or modified.

The licensee stated that only the conduct of operations admin topic was new. This meant that 12 of 15 were from the bank which was acceptable per ES-301.

SRO EXAM

How does "Verification of Offsite Electrical Lineup" fit under Conduct of Operations? In addition, the K/A selected for the conduct of operations JPM does not come from Section 2 of the K/A catalog. ES-301 section D.3.a states that K/A's associated with each administrative topic can be found in Section 2 of the applicable K/A catalog.

Licensee stated that it fits under verification of plant parameters and that the associated K/A should be 2.3.31.

None of the 5 administrative topics list whether they are direct from the bank, new, or modified.

Does the JPM for equipment control differ between RO and SRO if so how?

No it does not. Three of the five SRO Admin JPMs are unique to the SRO exam.

Walk-Through

The licensee submitted 4 versions of ES-301-2. An ES-301-2 RO, ES-301SROI, ES-301SROU, and an ES-301-2 which appears to be a combination of the RO and SROI versions but is slightly different, i.e. it's missing titles. Which are the valid versions?

The licensee stated that the combined version was sent to the NRC in error.

RO EXAM

JPM b. only has ES-301 for a title.

Licensee stated Title should be "Manually Initiate CS System w/E21-F005 Stuck shut."

ES-301 Section D.4.a states, "Each of the control room systems and evolutions (and separately each of the in-plant systems and evolutions) selected for the RO and SRO-I applicants should evaluate different safety functions, and the same system or evolution should not be used to evaluate more than one safety function in each location. On the RO walk through outlines items a and h both evaluate safety function 2. On the SRO-I walk through outlines items a and g evaluate the same safety functions. RO outline item h and SRO-I outline item g are the same JPM this will cause confusion during the administration of the examination.

The licensee stated that having two JPM's with the same safety function in the control room portion was a mistake and will resubmit the outlines with a different JPM. In addition, having the same JPM's with different letter designators was caused by Microsoft Word auto numbering system. The licensee stated that these will be fixed also.

In plant walk through item K on the RO exam and J on the SRO-I exam is to be conducted in the control room. Can this be verified by the inspectors without breaking exam security?

The licensee stated that they were confident that the JPM could be verified by the inspectors without breaching exam security.

There is no description of RO walk through items g and h. It is difficult to assess if they are alternate path JPMs. For example if the JPM starts with the failure of the SGTS exhaust damper and the operator has to correct the situation that is not an alternate path JPM.

The licensee explained to the examiner how the JPM's were to be conducted and also stated they were confident they understood the requirements for an alternate path JPM.

SRO EXAM

The same JPM is given three different letter designators between the RO, SRO-I, and SRO-U outlines. For example, Defeat of RBCCW/EECW to Drywell is i on the RO exam, h on the SRO-I exam, and d on the SRO-U exam. This will make exam administration difficult and could lead to an exam security breach.

The licensee stated that having the same JPM's with different letter designators was caused by Microsoft Word auto numbering system and that this would be corrected when the outline is resubmitted.

No low power JPM for SRO-U.

The licensee agreed with this observation and will correct it.

Simulator Dynamic Scenarios

Appendix D, Section B.2 states that, "The initial conditions should be varied among the scenarios and should include startup, low power, and full power situations." The two scenarios selected both start at 100 percent power.

The licensee stated that they would switch one scenario with the spare which was a low power scenario.

How are 2 scenarios enough for 9 operators?

The licensee stated that the chief examiner agreed that 4 crews on two different days was acceptable.

Where is ES-301-5? Where is partial ES-301-4?

The licensee stated that they will submit these with the examination.

ES-301 Section D.5.b states that at least one of the scenarios must be new or significantly modified. Which, if any, of the scenarios are new or from the bank?

The licensee stated that all the scenarios were new.

What's the difference between Event 5 in Scenario 1, "Recirc Flow Limiter "A" Logic Failure," and Event 3 in Scenario 2, "RR "A" Flow controller fails high?"

Scenario 2 has 2 major events. The power reduction is designated as a normal. Without a reactivity event there are not enough component/instrument failures in this scenario. A Major can count as a component failure but not both.

The licensee stated that Event 5 in Scenario 1 was designed to prevent an expected run back while Event 3 in Scenario 2 was designed to cause an unexpected uncontrolled increase in Recirculation Pump speed. The licensee also stated that were planning out changing one of the scenarios with the spare and removing one of the three major events listed in the spare.

In Scenario 2, Event 7 is "SLC Tank Level Transmitter Failure," for this event to count as a malfunction after EOP entry it must change the mitigation strategy. How does this event impact the mitigation strategy?

Scenario 3 has 3 Major events. Two events are listed as both component failures and major events. They can be one or the other but not both. Event 8 is RHR A fails to start how does this impact mitigation strategy in order to count as a component failure after EOP entry.

The licensee stated they would make changes to this scenario.